

# CDF Operations Report

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**CDF Weekly Meeting** 

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### Thursday, 1/20

- Lost Store 3929 about 14:40. and got controlled access:
  - Fixed CPR connection on SE arch
  - New diode boards for CES strip 64-95 on Wedge 17E
  - Fixed damaged cable connector on CHA 3L04E.
  - performed some low level maintenance on solenoid system.

#### Friday, 1/21

- Muon scint. PC has been restored, IFIX is again functioning.
- Tevatron lost the D1 Wet Engine, CDF controlled access:
  - CEM: one bad channel with zero pedestal, BMU: noise channel
  - Silicon: light output measurement
  - Installed new beam loss monitor counters near low beta quads.
  - Replace phototubes on several BSC.

### Weekend, 1/22-23

- Really quite weekend due to N and H leaks in D1 refrigerator building
- Store 3939 lost due to a quench again

### Monday, 1/24

- Store 3943: Initial lum 64.37E30, but Tevatron quenched at 05:55 due to Tev E2 wet engine. 2 controlled accesses:
  - Silcon
  - West 4-5 CMX
  - CES:
  - West BMU diagnostic work
- The E2 cold compressor tripped at 17:20, and the TeV quenched
- One more controlled access at 17:45; Halo counter work

#### Tuesday, 1/25

- Store 3944: Initial lum 110E30
- Many problems at the beginning of the store lost couple hours to problems with L3/EVB, b0ccal13
- After solving the problem, Mostly quiet stores with good DAQ efficiency
- High Luminosity Running without ISL crates
  - to study effect on high BUSY dead time problem.
- CPR HV trip, communication problem b/w the proxy process and RC.
- Found 2 new holes in TrigMon SVT occupancy; took Silicon out.

#### Wednesday, 1/26

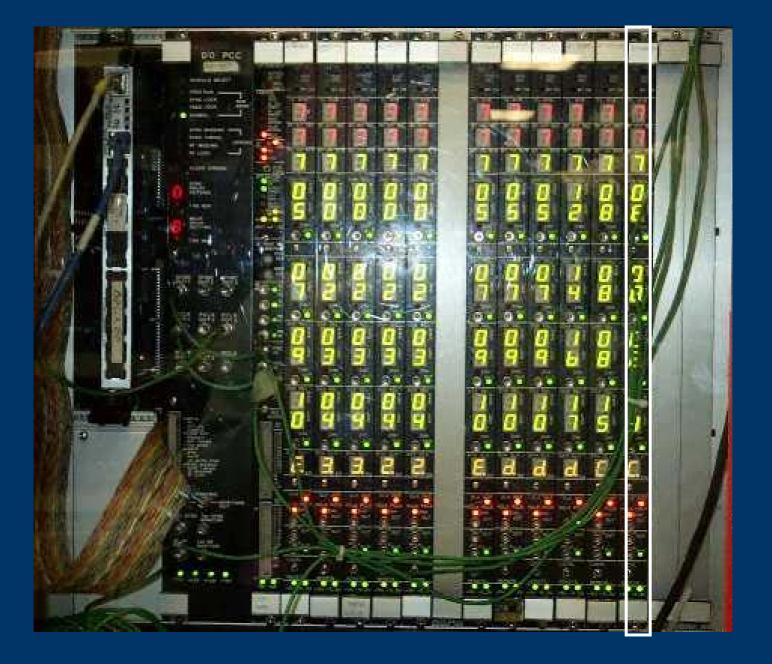
- Inherit store 3944
- Several "End of Store" tests are done!!
  - SVT test run for "long cluster cut"
  - Silicon D-mode calibration run
  - Trigger table tests and Pulsa tests
  - New EVB code test
  - Low luminosity running with ISL crates
  - Alpha board test run
  - New trigger table test: PHYSICS\_HIGHLUM\_3\_00 [2,572,521]
- Beam lost at 14:46 with a quench at QFA4
- Silicon controlled access to fix a L00 crowbar fuse but fuse was fine.
   so we have two chips that no longer work. ...still investigating

### Luminosity...

- Delivered 7.5 last week, 68.9 post shutdown
- Tape 5.3(70%) last week, 52.8(77%) post shutdown
- Good w/o Si 4.8(63%) last week, 44.7(65%) post shutdown
- GoodRun w/ Si 4.5(60%) last week, 34.6(50%) post shutdown

#### Thursday, 1/27

- Many problems during the shot setup (store 3948)
   lost several hours to problems with CDF clock, DAQ, IFIX etc...
   found one faulty "clock fan-out module" in CDF clock system, replaced it.
   special thanks to S. Chappa, S. Hahn and all shift crew (evening/owl/Si)
- CDF clock was up and running at 02:10, started to take a data.
- The loss of the clock caused major problems for the muon triggers. (99% DT)
  - spent another couple hours to figure out the problem
  - special thanks to Cheng-Ju, E. James and Mitch Soderberg
- finally we got reasonable values of dead time (04:20)
- integrated Silicon in DAQ at 04:50
- dead time down to ~4% level (06:15)
- plug SMX calibration (b0ccal04 power-cycled)
- .... taking data now..



### CDF Offline Status

### Data Processing

- Currently, we are processing only stream-A,B,G data using 5.3.1 release ProductionExe. After 6.1.0 release is ready, all the streams will be processed with the final calibrations.
- Data processing was delayed by more than 1 week at the beginning of this
  week because of the delay of the beamline calibrations. The delay was caused
  by the failure of "predator", and raw data files did not show up in the SAM
  database. It's fixed now.
- Raw data processing:
   Last processed run (as of 1/27/2005, 9:00am): run 192505 (1/20/2005)
   [there are no run to be processed from 1/21 1/23]
- Express production: up to run 192505 (1/20/2005)

### Software Development

- 6.1.0pre3 release is now being built.
- This release is built for physics validation of v6 release.
- We will process W and Z samples (e and mu) and jet50 sample, and we would like to request physics experts to validate these samples.